## On some new Genera and Species of Ichneumonidae from the Iimalayas.

 (Hym.)By P. Cameron.<br>(Fortsetzung aus H. 6, 1907, p. 469.)

3. Ephialtes longiventris, sp . nov. ㅇ.

Black, the 4 front legs bright yellow, the apices of the tarsal joints slightly fuscous; the hind coxae and femora bright red; the basal joint of the trochanters black, the apical white, the tibiae and tarsi dull whitish yellow; the lower side of the tibiae and the apex all round black, the tarsal joints infuscated. Wings hyaline, the nervures and stigma black. - Length 27 mm ; terebra 26 mm .

Sikkim.
Thickly covered with white pubescence, which is longest on the pleurae and on the sides of the abdomen. Face finely punctured, almost smooth in the middle; the front and vertex almost smooth. Antennal scape bright lemon-yellow, except above. Pro- und mesonotum closely punctured, but not strongly; the metanotum much more strongly punctured, the apex more closely than the base; the punctures extend to the pleural keel; the part below the latter is smooth, bare, shining; the pro- and mesopleurae smooth and shining. The abdomen is long and slender ( 21 mm long), the basal 2 segments being together longer than the head and thorax united. The first segment is not much more than half the length of the second.

The abdomen is longer and thinner than usual ; as compared with E. iridipennis Cam. from Simla, apart from the marked difierence in the colouration of the legs, that species may be known by the 1 st abdominal seyment heing longer than the $2^{\text {nd }}$. In E. latiannulata Cam. from Sikkim the $1^{\text {st }}$ abdoninal sugment is as long as the $2^{\text {nd }}$, the abdomen is stout, not elongated and the legs are rufous, the 4 hinder tarsi black. the hind tibiae black, broadly white above.

## 4. Gen. Xanthopimpla.

1. Xanthopimpla cera sp. nov. ㅇ.

Luteous; a triangular spot covering the ocelli, a broad line on the mesonotum at the tegulae, the sides larger than the middle: the basal lateral areae of metanotum, 2 spots on the $1^{\text {st }}$ abdominal segment, narrowed on the inner side at the apex, at where they are not half the thickness of the outer side and lighter in colour, 2 broad transverse marks on the 3 rd, 2 wider and thinner ones on the $5^{\text {th }}$ and narrower, almost united ones on the 7 th ; and the hinder knees, black. Ovipositor slightly shorter than the hind tarsi. Wings hyalime, the nervures and stigma black. - Length 9 mm ; terebra $1,5 \mathrm{~mm}$.

Himalayas.
Head and thorax smooth, shining, the face and clypeus covered with white pubescence. Parapsidal furrows narrow, indicated on basal slope only. The inner keel of the basal lateral areae forms 2 oblique slopes, of which the inner is the shorter and is more rounded, not so straight and oblique; the black does not fill it entirely; the lateral bordering keel is distinct; from the apex of its upper third a keel runs obliquely to near the inner angle of the upper keel. The $3^{\text {rd }}$ and following segments of the abdomen are closely punctured, the puncturation becoming gradually weaker towards the end; there are apical transverse furrows on the $2^{\text {nd }}$ to $6^{\text {th }}$ segments; they becoming gradually weaker; they are not very strongly crenulated.

This species is closely related to X. Binghami ; it is larger, has all the marks on the abdomen separated, those oll the $1^{\text {st }}$ segment are distinctly narrowed on the innerside, not dilated there ; the inner keel of the lateral areae forms a broad, rounded curve, without angle, it being also wider compared with the width, and there is an area, open on the innerside, which does not exist in Binghami.

## 2. Xanthopimpla Kriegeriana, sp. nov. 오.

Luteous, a triangular spot covering the ocelli, 3 large marks on the base of mesonotum, the lateral irregularly oval, the central larger, wider than long; the basal metanotal areae, 2 marks on the 1 st abdominal segment, 2 larger broader ones on the $3^{\text {rd }}$, $5^{\text {th }}$ and $7^{\text {th }}$, the basal joint of the hinder trochanters and the base of the hinder
tibiae, black. Wings hyaline, the apex slightly clouded, the stigma and nervures black; the areolet wide, shortly appendiculated, receiving the recurrent nervure before the middle. Metanotum with only 2 large, 5 -angled lateral basal areae. Ovipositor slightly shorter than the hind tarsi. - Length 10 mm ; terebra $1,5 \mathrm{~mm}$.

Himalayas.
Head and thorax smooth, the face densely covered with white pubescence; the clypeus less densely pubescent. Parapsidal furrows narrow, distinct on basal slope only. The inner side of the metanotal areae is long, roundly curved; the outer basal half is almost straight ; the apical is obliquely sloped to the lateral keel, where it forms a sharp angle with the inner one. The 1 st abdominal segment is not one fourth longer than it is wide at the apex; the base is depressed, the depression keeled laterally ; the other segments are wider than long, the 2 nd wider than the others compared with the width; it is smooth as is also the apical; the others are closely, distinctly punctured; the furrow on the apex of the 2 nd segment is wide, deep and stoutly striated; the striae clearly separated ; the apical furrows on the 3 rd to $6^{\text {th }}$ are not so deep nor so strongly striated; their basal furrows are weak. All the spots on the abdomen are wider than long; the $1^{\text {st }}$ pair are obliquely narrowed on the innerside; the 2 nd are irregular and narrower on the innerside ; the 3rd broadly, but not much narrowed at the apex; the $4^{\text {th }}$ are of almost equal width.
3. Xanthopimpla Binghami, n. sp. $\sigma^{\top}$.

Luteous, a triangular mark covering the ocelli, a broad, somewhat irregular stripe on the mesonotum between the tegulae which they do not quite reach, the lateral basal areae, 2 irregular transverse marks on the $1^{\text {st }}$ abdominal segment, a broad, irregular transverse stripe in the middle of the 3rd , slightly roundly narrowed at the base and with a small triangular incision in the middle of the apex, 2 broad transverse marks on the $5^{\text {th }}$, a narrower transverse stripe on the base of the $7^{\text {th }}$ and a short black line on the base of the hind tibiae, black. Flagellum of antennae brown, black above. Wings hyaline, slightly clouded at the apex, the stigma and nervures black; the areolet shortly appendiculated, receiving the recurrent nervure in the middle. Metanotum with only 2 areae at the sides of the base; they are wider than long,
the sides slightly oblique, the inner longer than the outer ; from the angles, the areae become narrowed to a rounded point ; the sides of the metanotum are bordered by a keel. - Length 7 mml ; terebra 1 mm .

Sikkim.
Face closely, but not strongly punctured, thickly covered with white pubescence ; the front and vertex smooth, bare. Thorax entirely smooth; the parapsidal furrows deep and wide at the base. Basal segment and the $2^{\text {nd }}$ to the transverse furrow smooth, shining; the others closely, not very strongly, but distinctly punctured; the $1^{\text {st }}$ is hardly one fourth longer than wide, longer than the 2 nd, which is longer than it is wide at the apex; the middle segments wider than long; the apical furrows on the apex of the $2^{\text {nd }}$ to $5^{\text {th }}$ are distinct, curved, striated; on the $3^{\text {rd }}$ is a crenulated basal furrow. On the apex of the hind tibiae are 3 pairs of bright red spines.

## 5. Gen. Pimpla.

1. Pimpla latisulcata, sp. nov. $\sigma^{7}$.

Black, the 4 anterior legs pale fulvous, their coxae and trochanters yellow; the hind legs rufous, the tibiae darker below, paler above, their tarsi black, a short line in the centre of the apex of $1^{\text {st }}$ abdominal segment and narrow lines on the apices of the $2^{\text {nd }}$ to $6^{\text {th }}$, yellow, tinged with rufous; wings hyaline, highly iridescent, the nervures and stigma black; the areolet wide along the cubitus, receiving the recurrent nervure in the apical fourth; the transverse cubital nervures meeting in front; the transverse median nervure interstitial. - Length 12 mm .

Sikkim.
Face and clypeus closely, strongly punctured, thickly covered with longish fuscous pubescence; the rest of the head smooth, bare, shining. Pro- and mesothorax shining, sparsely, weakly punctured; the scutellum with a wide furrow, slightly narrowed towards the apex, down the centre; it is more strongly punctured than the mesonotum; metanotum to the pleural keel strongly closely punctured and thickly covered with white pubescence. Abdomen more than twice the length of the thorax, strongly rugosely punctured, the punctures much stronger on the basal segments; the basal furrows crenulated.

## 2. Pimpla sikkimensis, sp. nov. ㅇ.

Black, a line, gradually widened from the base to the apex, tegulae and palpi pale yellow; the 4 anterior legs pale fulvous, the coxae and trochanters pale yellow, the middle tarsi infuscated; the hind legs with the coxae, trochanters and femora rufous, the coxae yellow above, the tibiae black below, whitish above, the tarsi black; wings hyaline, the stigma and nervures black. - Length 9 mm body and ovipositor.

Sikkim.
Smooth, shining ; the median segment to the pleural keel strongly, but not very closely punctured and thickly covered with white hair. Scutellum punctured, but not closely or strongly. Abdomen closely, strongly punctured, the punctuation becoming weaker towards the apex. Sheaths of ovipositor thickly covered with black longish hair. Areolet longish along the cubitus, the nervures almost touching in front; the recurrent nervure received close to the base of the apical fourth; the transverse median received shortly behind the transverse basal.

Comes near P. vidua Cam., which has, inter alia, the coxae and base of trochanters black.
6. Glypta tricarinata, sp. nov. 오.

Black ; the clypeus, mandibles, palpi and a triangular mark on the apex of pronotum, bright yellow; a testaceous narrow line on the base of the $1^{\text {st }}$ and on the apices of the 2 nd and 3 rd abdominal segments, and a short line on the sides of the $4^{\text {th }}$ at the apex; the 4 front coxae and trochanters pale yellow; the rest of the legs fulvous, the fore femora largely tinged with yellow; the hind coxae rufous, the trochanters bright yellow, the femora blackish fuscous, paler on the inner side; the tibiae testaceous, black at the apex, the tarsi of a darker testaceous colour, blacker at the apex; wings hyaline, the stigma and nervures black. - Length 10 mm ; terebra 5 mm .

Sikkim.
Face irregularly, transversely striated, the sides irregularly punctured. Front somewhat strongly punctured ; the vertex weakly, sparsely punctured. Clypeus smooth. Basal half of mesonotum closely, finely reticulated, the apical with distinctly separated punctures. Scutellum strongly, closely punctured. Metanotum punctured, more finely at the base than in the middle, more coarsely, rugosely on the apical slope; on the sides are 2 large
areae, the basal being smaller and square, the apical longer than wide; there is a longer, narrower one separating them in the middle. Propleurae, except below and the mesopleurae, except at the apex above, closely punctured. Metapleurae more strongly and closely punctured, the upper part at the apex more or less striatedreticulated; shortly above the middle is a curved narrow keel. Basal 4 segments of the abdomen closely, somewhat strongly punctured; the basal 3 with a narrow, but distinct keel down the centre; on the 1 st segment, on eitherside of the central, is a similar keel, not reaching to the base and apex; the oblique depressions are wide and deep.

## 7. Gen. Lissonota.

## 1. Lissonota spilopus, sp . nov. $\mathrm{o}^{7}$.

Black ; the face, clypeus, mandibles, except the teeth, the inner orbits somewhat broadly, a line on the lower edge of the propleurae, a large mark on eitherside of the base of the mesonotum, gradually narrowed from the wide apex to the base, the apex with a triangular incision, scutellum, except the apical slope, a large mark on the sides of the metapleurae, broadly rounded at the base above, the apex narrower and transverse, below with a wide, rounded incision, tubercles, a small triangular mark under the hind wings, a large mark on the lower part of the mesopleurae, its apical half triangularly dilated, the base of the basal 4 abdominal segments broadly, the marks becoming gradually narrower, and the apices of the segments, narrowly, pale yellow. Antennae brownish. the underside of the scape and a broad band near the apex, white. Wings hyaline, the nervures and stigma black; the areolet triangular, shortly appendiculated, the recurrent nervure interstitial with the $2^{\text {nd }}$ transverse cubital. Four front legs pale yellow, slightly tinged with fulvous; their tarsi, slightly infuscated; the hind legs with the coxae rufo-fulvous, yellow above at the base, black at the apex, the trochanters pale fulvous, tinged with yellow; the femora rufo-fulvous, narrowly black at the base and apex; the tibiae and tarsi pale yellow, the apex of the former from near the middle, almost the basal half of the metatarsus and the apex of the apical joint from shortly behind the middle, black. - Length 9 mm .

Sikkim.
Face somewhat strongly punctured in the middle, the sides smooth; the front and vertex smooth, bare,
shining; the former furrowed in the middle. Mesonotum closely, strongly punctured; the scutellum less strongly and more sparsely punctured. Metanotum closely, strongly transversely striated, towards the apex more or less reticulated. Propleurae sparsely punctured above, the rest for the greater part irregularly striated, the upper striae roundly curved. Mesopleurae irregularly punctured; the apical central part smooth; the metapleurae more closely and much more strongly punctured. Hind coxae strongly punctured.

The mark on the upper eye orbits becomes gradually roundly widened towards the middle ; a short black line runs down from the antennae; clypeal foveae transverse, oval, fuscous. The $1^{\text {st }}$ abdominal segment slightly longer than the following 2 united, slender, cylindrical, of equal width throughout.

## 2. Lissonota lepida, sp. nov. $\sigma^{\text {th }}$.

Black, the face, the inner orbits broadly, the yellow reaching to the ocelli in the middle, obliquely narrowed above and below, a large mark on eitherside of the base of the mesonotum, triangularly incised in the middle, scutellum, the lower edge of the propleurae, tubercles, a large mark on the lower half of the mesopleurae, the top straight to the end above, obliquely sloped below, the base rounded; below it becomes gradually obliquely widened to near the apical fourth, which is straight below; a large mark on the centre of metapleurae, its base straight, rounded above, the apex narrower, rounded, the middle below incised, the base of the incision obliquely sloped, longer than the apex, which has a straight up and down slope, the basal half of the $1^{\text {st }}$ and $2^{\text {nd }}$ abdominal segments, the $3^{\text {rd }}$ except for a curved fuscous black band shortly beyond the middle, and the apices of the other segments broadly, yellow. Legs yellow, tinged with fulvous; the apical half of the hind coxae black above. Areolet triangular, sessile, the 2 nd recurrent nervure interstitial, largely bullated below. Antennae yellowish, fuscous above, a broad white band beyond the middle. - Length 8 mm.

Sikkim.
Head smooth, the centre of the face distinctly, but not closely punctured ; the clypeus with a few scattered punctures. Mesonotum and scutellum closely, somewhat strongly punctured, their pleurae less strongly punctured;
the propleurae striated below ; the mesopleurae with a large smooth space in the middle. Metanotum closely, strongly transversely reticulated, much more strongly at the apex than at the base; the pleurae are sparsely punctured, more sparsely above than below. The black apical half of the $1^{\text {st }}$ abdominal segment is thicker than the basal ; the black has a triangular incision at the base.

May be known from L. spilopus by the broader band on the inner orbits, it touching the ocelli, which is not the case with L. spilopus; by the base of the mark on the mesopleurae being gradually narrowed from the middle, it being in spilopus abruptly dilated before the middle and by the incision on the mark on the metapleurae being narrower, deeper and oblique.

# Zur Kenntnis der Schmarotzerbienen Brasiliens. (Hym.) 

Von A. Ducke in Pará.

Seit ich im Anfange des Jahres 1905 meinen Aufsatz „Zur Abgrenzung der neotropischen Schmarotzerbienen aus der nächsten Verwandtschaft von Melissa Sm." (s. diese Zeitschrift 1905, Heft 4, pag. 227-229) schrieb, ist mir aus dieser Gruppe ziemlich viel neues Material in die Hände gekommen, das teils von Herrn Ingenieur $P$. Le Cointe und mir selbst am unteren Amazonas, teils von mir bei Barbacena im centralbrasilianischen Staate Minas Geraes gesammelt wurde, teils durch Collegen $R$. von Ihering vom Museu Paulista im Tauschwege erworben wurde. Hierdurch sehe ich mich genötigt, meine im citierten Aufsatze gegebene Gattungsübersicht etwas zu verändern ; und anderenteils bin ich in der Lage, die bei Epeolus stehende, bisher fast unbekannte Schmarotzerbienengattung Liopodus Sm. zu behandeln.

Ich gehe zuerst an die Gattungen aus der Verwandtschaft von Melissa. Leider habe ich mich früher verleiten lassen, dieselben hauptsächlich nach der Gestalt der Kiefertaster einzuteilen; bei reichlicherem Material habe ich aber jetzt auch für diese (wie schon früher für andere) Bienengruppe erkannt, dass auf diese Weise einander nahestehende Arten, entgegen der natürlichen

